4ipnet®
for your IP network

Quick Installation Guide

WHG405 V2.10

Secure WLAN Controller

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FCC Caution

This equipment has been tested and proven to comply with the limits for a class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

Preface

This Quick Installation Guide provides instructions and reference material for getting started with the 4ipnet WHG405 Secure WLAN Controller. This guide will also show how to connect 4ipnet WHG405 to other network equipments.

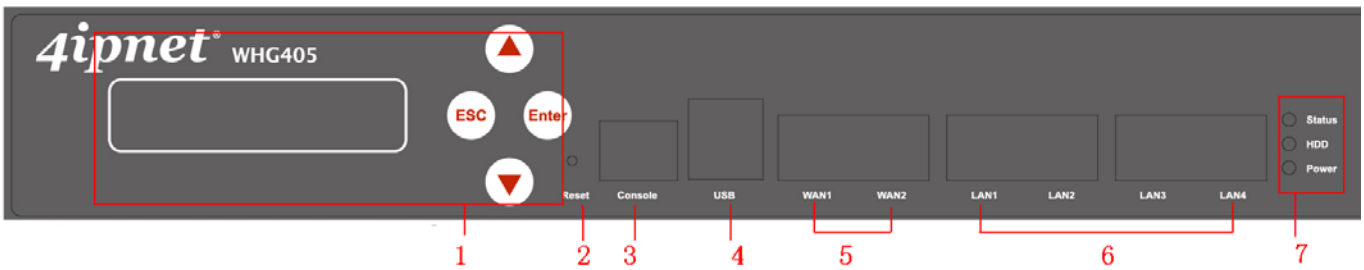
Package Contents

1. WHG405 x 1
2. CD-ROM (User's Manual and QIG) x 1
3. Quick Installation Guide (QIG) x 1
4. Console Cable x 1
5. Ethernet Cable x 1
6. Power Cord x 1
7. Rack Mounting Bracket (with Screws) x 1

It is highly recommended to use all the supplies in the package instead of substituting any components by other suppliers to guarantee best performance.

System Overview

Front Panel



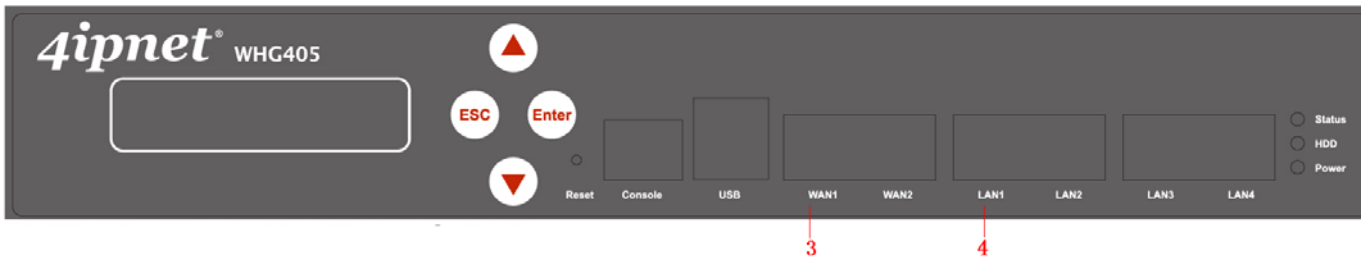
1. **LED Display:** Allows network administrator to check important system settings such as network interface, SZ configurations, etc. The navigations buttons from left to right respectively are, ***Esc***, ***Up***, ***Down***, and ***Enter***.
2. **Reset:**
   - Press and hold the Reset button for about 5 seconds and status of LED on front panel will start to blink before restarting the system.
   - Press and hold the Reset button for more than 10 seconds and status of LED on the front panel will start to speed up blinking before resetting the system to default configuration.
3. **Console:** The system can be configured via a serial console port. The administrator can use a terminal emulation program such as Microsoft's Hyper Terminal to login to the configuration console interface to change admin password or monitor system status, etc.
4. **USB:** Reserved for future use.
5. **WAN1/ WAN2:** Two WAN ports (10/100/1000 Base-T RJ-45) are connected to the external network, such as the ADSL Router from your ISP (Internet Service Provider).
6. **LAN1~LAN4:** Client machines connect to WHG405 via LAN ports (10/100/1000 Base-T RJ-45).
7. **LED Indicators:** There are three kinds of LED, **Power**, **Status** and **Hard-disk**, to indicate different status of the system.

Rear Panel

Power Supply Socket: Connecting the power cord to the built-in open-frame power supply (Input: 100~240 VAC, 50/60 Hz).

Hardware Installation

Please follow the following steps to install WHG405:

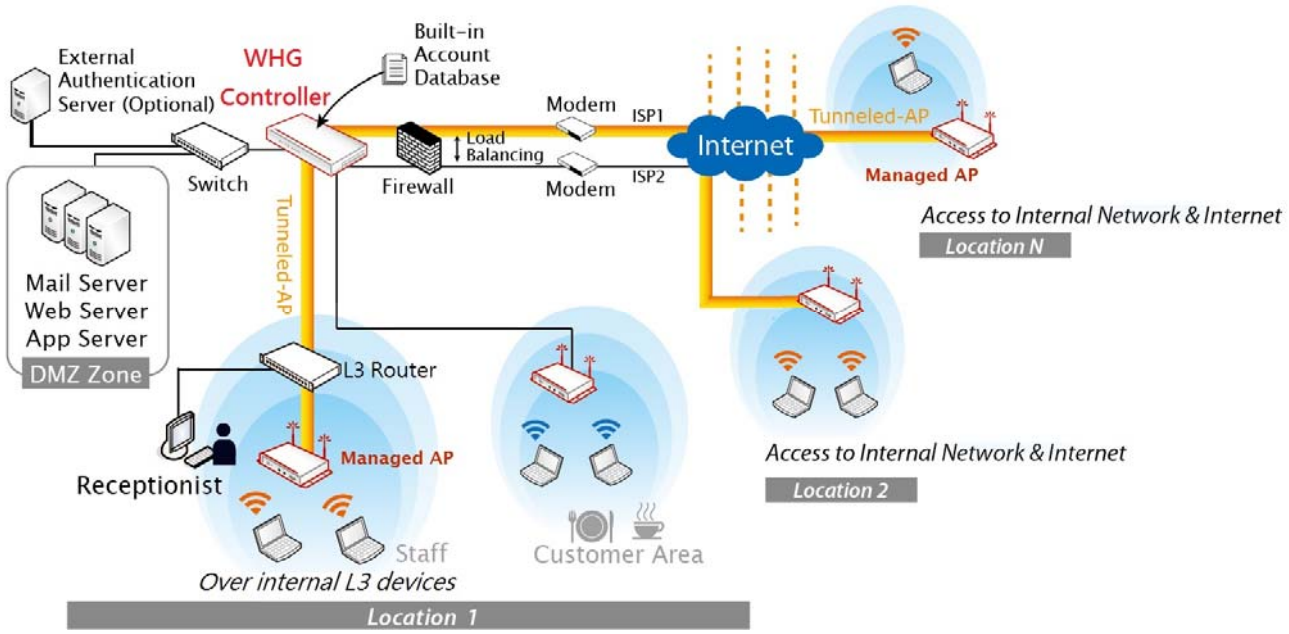


1. Connect the power cord to the power socket on the rear panel.
2. The Power LED should be on to indicate a proper connection.
3. Connect an Ethernet cable to the WAN1 Port on the front panel. Connect the other end of the Ethernet cable to an xDSL/cable modem, or a switch/hub of an internal network. The LED of this port should be on to indicate a proper connection.
4. Connect an Ethernet cable any LAN Port on the front panel. Connect the other end of the Ethernet cable to an administrator PC for configuring the system, an AP for extending wireless coverage, a switch for connecting more wired clients, or a client PC. The LED of this LAN port should be on to indicate a proper connection.

Getting Started

< System Concept >

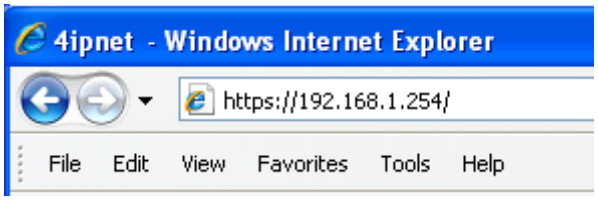
4ipnet WHG405 is capable of managing user authentication, authorization and accounting. The user account information is stored in the local database or a specified external database server. Featured with user authentication and integrated with external payment gateway, WHG405 allows users to easily pay the fee and enjoy the Internet service using credit cards through Authorize.net, PayPal, SecurePay, or WorldPay. With centralized AP management feature, the administrator does not need to worry about how to manage multiple wireless access point devices. Furthermore, WHG405 introduces the concept of Service Zones - multiple virtual networks, each with its own definable access control profiles. This is very useful for hotspot owners seeking to provide different customers or staff with different levels of network services. The following diagram is an example of WHG405 set to manage the Internet and network access services at a hotspot venue.



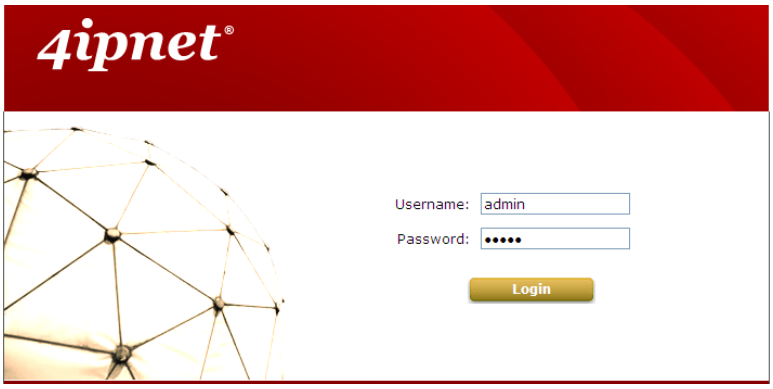
< Web Management Interface >

4ipnet WHG405 supports web-based configuration. Upon the completion of hardware installation, WHG405 can be configured via web browsers with JavaScript enabled such as Internet Explorer version 6.0 and above or Firefox.

1. To access the web management interface, connect a PC to the LAN Ports, and then launch a browser. **Make sure you have set DHCP in TCP/IP of your PC to get an IP address dynamically.**
2. Next, enter the gateway IP address of WHG405 at the address field. The default gateway IP address is***"http://192.168.1.254"*** (**"https"** is used for a secured connection).

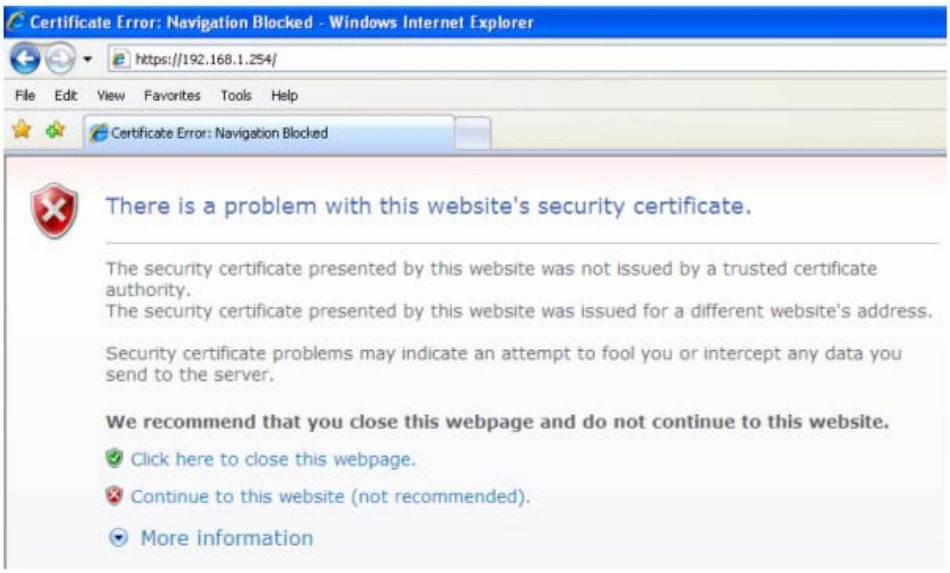


3. The administrator login page will appear. Enter ***"admin"***, the default username, and ***"admin"***, the default password, in the User Name and Password fields. Click ***Login*** to log in.



4. After a successful login, a Home page will appear on the screen.

For the first time, if WHG405 is not using a **trusted SSL certificate**, there will be a **"Certificate Error"**, because the browser treats WHG405 as an illegal website. Please press **"Continue to this website"** to continue. The default user login page will then appear in the browser. *For more information, please see **WHG405 User's Manual***.


Certificate Error: Navigation Blocked - Windows Internet Explorer
https://192.168.1.254/
File Edit View Favorites Tools Help
Certificate Error: Navigation Blocked
There is a problem with this website's security certificate.
The security certificate presented by this website was not issued by a trusted certificate authority.
The security certificate presented by this website was issued for a different website's address.
Security certificate problems may indicate an attempt to fool you or intercept any data you send to the server.
We recommend that you close this webpage and do not continue to this website.
Click here to close this webpage.
Continue to this website (not recommended).
More information

If you can't get the login screen, the reasons may be: (1) The PC is set incorrectly so that the PC can't obtain the IP address automatically from the LAN port; (2) The IP address and the default gateway are not under the same network segment. Please use default IP address such as 192.168.1.xx in your network and then try it again. For the configuration on PC, please refer to ***WHG405 User's Manual,*** *"****Network Configuration on PC & User Login****".*

Common Settings

< Setup Wizard >

WHG405 provides a **Setup Wizard** for quick configuration. To quickly configure WHG405 by using the **Setup Wizard**, click on the **Setup Wizard** button to start the configuration process.

To logout, simply click the ***Logout*** icon on the upper right corner of the interface to return to the login screen.

Note: During every step of the wizard, if you wish to go back to modify the settings, please click the ***Back*** button to go back to the previous step.

Step 1: General

- Enter a ***New Password*** for the admin account and retype it again in the ***Verify Password*** field (20 characters maximum and no spaces).
- Select an appropriate time zone from the ***Time Zone*** drop-down list box to set up the system time.
- Click ***Next*** to continue.

For security concern, it is strongly recommended to change the administrator's password

Step 2: Select Connection Type for WAN1 Port

- There are three types of WAN connections to be selected from: **Static IP Address**, **Dynamic IP Address** and **PPPoE Client**. Select a proper Internet connection type. Below depicts an example of using Dynamic IP connection.
- Click ***Next*** to continue.

- For **Static IP Address** or **PPPoE Client**, follow the instructions showing on the screen.

Step 3: Local User Account (Optional)

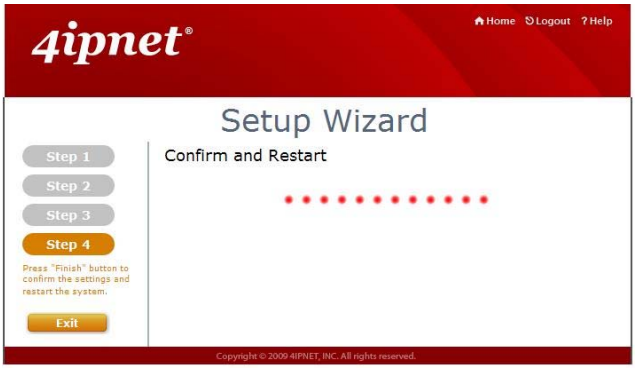
- A new user can be added to the Local User database. To add a user here, enter the ***Username*** (e.g. testuser), ***Password*** (e.g. testuser), ***MAC Address*** (optional, to specify the valid MAC address of this user) and assign an ***Applied Group*** to this particular user (or use the default **None**).
- More users can be added by clicking the ***Add Now*** button.
- Click ***Next*** to continue.

Step 4: Confirm and Restart WHG405

- Click ***Finish*** to save current settings and restart the system.

- A confirmation dialog box will then appear. Click ***OK*** to continue.

- A **Confirm and Restart** message will appear on the screen during the restarting process. Please do not interrupt the system until the Administrator Login Page appears.



Please do NOT interrupt WHG405 restart process until the ***Configuration Wizard*** pop-up window has disappeared – which indicates the restart process has been completed.

Now, the basic configuration is completed.
If all steps are done properly, you can start working on the system or refer to the user's manual for advanced settings.

< User Login >

After completing the configuration wizard, the user account generated can be used to login to the system to verify whether the configuration of local user account is done properly.

First, connect a client device (e.g. laptop, PC) to one of the LAN Ports. The client device must be set to use **DHCP** in TCP/IP configuration to obtain an IP address automatically.

1. Open an Internet browser on a client device and access any URL, the default **User Login Page** will be displayed.

2. Enter a username and password previously created in the Local User account database (e.g. **"test@local"** for *Username* and **"test"** for *Password*) or from an On-demand User account.

   Check the ***Remember Me*** box to store the username and password on the current computer in order to automatically login to the system at next login. Then, click the ***Submit*** button.

   The ***Remaining*** button on the **User Login Page** is for on-demand users only, where they can check their Remaining Usage time.

> ⚠ *To provide temporary users with free or paid wireless Internet access, the administrator can enable **On-demand User** authentication to create On-demand User accounts. Please refer to **On-demand User & User Login, WHG405 User's Manual**.*

3. **Congratulations!**

   The **Login Successful** page appearing means WHG405 has been installed and configured successfully. Now, you are connected to the network and Internet!

< Service Zone & AP Management >

4ipnet WHG405 has introduced an important new concept called **"Service Zone"**. For how to set up Service Zones, please refer to ***Service Zone***, ***WHG405 User's Manual***.

For how to set up the **"AP Management"** feature, please refer to the ***AP Management, WHG405 User's Manual***.

For further configuration and information, please refer to the User's Manual.

P/N: V21020121116